JERICHO SYSTEMS INC.
Progress & Preservation

47 1st Street, Suite 1
Redlands, CA 92373-4601
(909) 307-5633

September 28, 2020

Lilburn Corporation
Attn: Cheryl Tubbs
1905 Business Center Dr.
San Bernardino, CA 92408

RE: Jurisdictional Delineation
Victorville Residential Care Facility
Spring Valley Lake - Unincorporated Area of San Bernardino County

Dear Ms. Tubbs,

On behalf of Lilburn Corporation, Jericho Systems, Inc. (Jericho) conducted a jurisdictional delineation (JD) for the Victorville Residential Care Facility (Project), located adjacent to the community of Spring Valley Lake, California. This report is designed to address potential effects to resources protected under the federal Clean Water Act (CWA) regulated by the U.S. Army Corps of Engineers (USACE) and Regional Water Quality Control Board (RWQCB) respectively, California's Porter-Cologne Water Quality Control Act (Porter-Cologne) administered by the RWQCB and Section 1602 of the California Fish and Game Code (FCG) administered by the CDFW. Background to the CWA, Porter-Cologne and FGC is provided below for context.

Fairway Equity, LLC is proposing to develop a residential care facility comprised of 100 assisted living units, 50 sub-acute rehab beds, 50 basic skilled nursing beds and 50 one-bedroom independent living units on approximately 17 acres. Approximately 2,000 linear feet of the channel traverses the southern boundary of the site and it ranges in width from 50 feet to 250 feet . In association with the development, the Project proposes to construct an access road across the wash with turnabout, three concrete drops structures, and a portion of a parking area within the confines of the wash limits.

The Project site is generally located in the southern portion of Section 22 & 23, Township 5 North, Range 4 West and is depicted on the *Victorville* U. S. Geological Survey's (USGS) 7.5-minute topographic map (Figure 1). The Project site is specifically located on Yates Road, south of Horseshoe Lane, and west of Park Road, approximately 2.6 miles east of Interstate 15, in the unincorporated area of San Bernardino County known as Spring Valley Lake (Figures 1-3). It is designated as Assessor's Parcel Number (APN) 0479-131-09 in an unincorporated area of San Bernardino County, California.

ENVIRONMENTAL SETTING

The City of Victorville is subject to both seasonal and annual variations in temperature and precipitation. The local climatic conditions in the project area are characterized by hot summers, mild winters, infrequent rainfall, and dry humidity. The average annual temperature is 62.3°F, ranging between 31-100°F. The rainy season begins in November and continues through April, with the quantity and frequency of rain varying from year to year. The average annual rainfall is approximately 6.18 inches.

Soils (depicted in Figure 4) in this area consist of three different types:

- Cajon sand is comprised of sand derived from alluvium. This soil type is somewhat excessively drained and is considered farmland of statewide importance.
- Kimberlina loamy fine sand. This sand is derived from alluvium and contains loamy fine sand, sandy loam and fine sandy loam. These soils are well drained and considered prime farmland if irrigated.
- Victorville sand. These soils are derived from alluvium derived from granite and contain sandy loam, stratified sandy loam to fine sandy loam, stratified and to sandy loam, and clay loam to loam. These soils are moderately well drained and considered prime farmland if irrigated.

Hydrologically, the site is located within an undefined Hydrologic Sub-Area (HSA 628.20) which comprises a 556,821-acre drainage area within the larger Mojave Watershed (HUC 18090208).

An unnamed ephemeral desert dry wash flows along the southern boundary of the Project site from west to east. It is tributary to the Mojave River as it flows into the Mojave Narrows Regional Park. This wash is a mix of earthen and concrete stormdrain until it reaches the project site where is entirely earthen and natural, then flows through Mojave Narrows Regional Park where it outlets to the Mojave River. Flows originate from the Oro Grande Wash located to the approximately 2.5 miles west of the Project site. As it leaves the stormdrain system at Lambert Lane, the channel remains earthen. Approximately 2,000 linear feet of the channel traverses the southern boundary of the site and it ranges in width from 50 feet to 250 feet.

REGULATORY BACKGROUND

Clean Water Act (CWA)

The CWA is the principal federal law that governs pollution in the nation's lakes, rivers, and coastal waters. Originally enacted in 1972 as a series of amendments to the Federal Water Pollution Control Act of 1948 the Act was last amended in 1987. The overriding purpose of the CWA is to "restore and maintain the chemical, physical and biological integrity of the nation's waters." Discharges of dredged or fill material in Waters of the U.S (WoUS) are regulated pursuant to Sections 404 and 401 of the CWA. The congressional intent of Section 404 of the CWA as articulated in Section 10 is to "maintain and restore the chemical, physical, and biological integrity of the nation's waters." Section 404 of the CWA gives the USACE and the U.S. Environmental Protection Agency (EPA) regulatory and permitting authority regarding discharge of dredged or fill material into "navigable waters." Permits issued by the USACE in California require certification by the State of California that the proposed discharge complies with the requirements of the California Porter-Cologne Water Quality Control Act. These certifications are issued by the State Water Resources Control Board or one of the nine RWQCBs.

Waters are defined broadly under the CWA to include all traditionally navigable waters, including those used or susceptible for use in interstate commerce, including all waters subject to the ebb and flow of the tide, interstate waters, territorial seas, impoundments and tributaries. Waters may also include wetlands and other waters that are not traditionally navigable such as wetlands that are adjacent to traditionally navigable waters. Wetlands are defined under federal regulations as "those areas that are inundated or saturated by surface or ground water at a frequency and duration sufficient to support, and that under normal circumstances do support, a prevalence of vegetation typically adapted for life in saturated soil conditions. Wetlands generally include swamps, marshes, bogs, and similar areas."

US Army Corps of Engineers Regulated Activities

Pursuant to Section 404 of the CWA, the US Army Corps of Engineers (USACE) regulates the discharge (temporary or permanent) of dredged or fill material into Waters of the US (WoUS), including wetlands. A discharge of fill material includes, but is not limited to, grading, placing riprap for erosion control, pouring concrete, laying sod, and stockpiling excavated material into WoUS. Activities that generally do not involve a regulated discharge (if performed specifically in a manner to avoid discharges) include driving pilings, performing certain drainage channel maintenance activities, constructing temporary mining and farm/forest roads, and excavating without stockpiling.

The limit of USACE jurisdiction, excluding wetlands and tidal waters, is delineated using the Ordinary High Water Mark (OHWM), defined in CFR 328.3(e) as:

> *…that line on the shore established by the fluctuations of water and indicated by physical characteristics such as [a] clear, natural line impressed on the bank, shelving, changes in the character of soil, destruction of terrestrial vegetation, the presence of litter and debris, or other appropriate means that consider the characteristics of the surrounding areas.*

On April 21, 2020, the United States Environmental Protection Agency (US EPA) and the United States Army Corps of Engineers (Corps) published, in the Federal Register, their final rule (2020 Rule) that revised the definition of "waters of the United States," narrowing the scope of waters subject to federal regulation under the Clean Water Act, particularly with respect to adjacent wetlands and ephemeral streams, and also abandons the "significant nexus text" in the 2015 Rule.

The 2020 Rule defines four categories of waters as jurisdictional:

1. *Waters which are traditionally thought of as "waters of the United States," those being the territorial seas and traditional navigable waters. 33 CFR 328.3(a).*
2. *Perennial and intermittent tributaries that contribute surface water flow to the territorial seas and navigable waters either directly or indirectly through other jurisdictional waters. 33 CFR 328.3(b).*
3. *Lakes, ponds, and impoundments that are standing bodies of water that contribute surface water flow in a typical year to a territorial sea or a traditional navigable water either directly or through another jurisdictional water. 33 CFR 328.3(c).*
4. *Wetlands that abut a territorial sea or traditional navigable water, or other jurisdictional water and that are inundated by flooding by a jurisdictional water in a typical year, are physically separated from a jurisdictional water by a natural berm, dune or similar feature or physically separated by an artificial structure so long as that artificial structure allows for a direct hydrologic surface connection between the wetlands and a jurisdictional water in a typical year. 33 CFR 328.3(c)*

The surface water flow is gauged in the "typical year" which is defined to mean "when precipitation and other climatic variables are within the normal periodic range (e.g. seasonally, annually) for the geographic area of the applicable aquatic resource based on a rolling thirty-year period." 33 CFR 328.3(c)(13). The "significant nexus test" with its reliance on whether a water has a significant nexus to another jurisdictional water has been abandoned in favor of this categorical approach.

The 2020 Rule excluded the following:

1. *Waters or water features that are not identified in paragraph (a)(1), (2), (3), or (4) of this section;*
2. *Groundwater, including groundwater drained through subsurface drainage systems;*
3. *Ephemeral features, including ephemeral streams, swales, gullies, rills, and pools;*

4. *Diffuse stormwater run-off and directional sheet flow over upland;*
5. *Ditches that are not waters identified in paragraph (a)(1) or (2) of this section, and those portions of ditches constructed in waters identified in paragraph (a)(4) of this section that do not satisfy the conditions of paragraph (c)(1) of this section;*
6. *Prior converted cropland;*
7. *Artificially irrigated areas, including fields flooded for agricultural production, that would revert to upland should application of irrigation water to that area cease;*
8. *Artificial lakes and ponds, including water storage reservoirs and farm, irrigation, stock watering, and log cleaning ponds, constructed or excavated in upland or in non-jurisdictional waters, so long as those artificial lakes and ponds are not impoundments of jurisdictional waters that meet the conditions of paragraph (c)(6) of this section;*
9. *Water-filled depressions constructed or excavated in upland or in non-jurisdictional waters incidental to mining or construction activity, and pits excavated in upland or in non-jurisdictional waters for the purpose of obtaining fill, sand, or gravel;*
10. *Stormwater control features constructed or excavated in upland or in non-jurisdictional waters to convey, treat, infiltrate, or store stormwater run-off;*
11. *Groundwater recharge, water reuse, and wastewater recycling structures, including detention, retention, and infiltration basins and ponds, constructed or excavated in upland or in non-jurisdictional waters; and*
12. *Wastewater treatment systems.*

"Ephemeral" is now defined as "surface water flowing or pooling only in direct response to precipitation (e.g. rain or snow fall)."

Activities Regulated by the State

A federal permit or license cannot be issued that may result in a discharge to WoUS unless certification under Section 401 of the CWA is granted or waived by EPA, the state, or the tribe where the discharge would originate (EPA 2010).

Pursuant to Section 401 of the CWA:

> *…any applicant for a federal permit for activities that involve a discharge to WoUS shall provide the federal permitting agency a certification from the state in which the discharge is proposed that states that the discharge will comply with the applicable provisions under the federal CWA.*

Therefore, before USACE will issue a Section 404 permit, applicants must apply for and receive a Section 401 water quality certification or waiver, as applicable. Under Section 401 of the CWA, all activities that are regulated at the federal level by USACE are also regulated at the state level.

Therefore, state jurisdiction usually includes all waters or tributaries to waters that are determined to be WoUS and, similar to WoUS, are typically delineated at the OHWM. State-regulated WoUS are overseen by the State Water Resources Control Board (SWRCB) and nine Regional Water Quality Control Boards (RWQCBs).

However, if waters are determined not to be WoUS, they may still be subject to state jurisdiction based on the Porter-Cologne Act, which are regulated by the SWRCB and the RWQCBs under California's Porter-Cologne Water Quality Control Act (Porter-Cologne). In April 2019, the SWRCB adopted a state wetlands definition and procedures for the discharge of dredged or fill material into waters of the State (collectively, the Procedures). The Procedures are expected to become effective in mid-2020. The Procedures establish a permit process for discharges to both wetland and non-wetland waters of the State. Under Porter-Cologne and the Procedures, "Waters of the State" are defined by the Porter-Cologne Act as

"any surface water or groundwater, including saline waters, within the boundaries of the state." Under the Procedures, a water of the State is a wetland "if, under normal circumstances, (1) the area has continuous or recurrent saturation of the upper substrate caused by groundwater, or shallow surface water, or both, (2) the duration of such saturation is sufficient to cause anaerobic conditions in the upper substrate, and (3) the area's vegetation is dominated by hydrophytes or the area lacks vegetation." This definition varies from the federal definition in several respects, most notably that the state considers unvegetated features, such as mudflats or playas, to constitute wetlands.

California Fish and Game Code

Sections 1600 to 1616 of the California Fish and Game Code require any person, state, or local government agency or public utility (i.e., an entity) to notify the CDFW before beginning any activity that will divert the flow of or substantially modify a river, stream, or lake or result in the deposit of certain waste materials that may pass into a river, stream or lake. Following receipt of such a notification, CDFW determines whether the activity may affect fish and wildlife resources and, if it will, issues a "Lake and Streambed Alteration Agreement" to be entered into by the entity and CDFW and which authorizes the activity in question. CDFW defines the term "stream" as "a body of water that flows perennially or episodically and that is defined by the area in which water currently flows, or has flowed, over a given course during the historic regime [i.e., 'circa 1800 to the present'], and where the width of its course can reasonably be identified by physical or biological indicators." CDFW regulates rivers and streams to their "maximum expression" on the landscape, often including the entire floodplain. *MESA Field Guide, Mapping Episodic Stream Activity* (2011).

METHODS

On August 26, 2020 Jericho regulatory specialist Shay Lawrey and biologist Christian Nordal evaluated the Project site for the limits of jurisdictional waters, i.e. Waters of the US (WoUS) and State streambed waters (or Waters of the State) as regulated by the USACE, RWQCB, and CDFW respectively. The survey area encompassed 1,800 linear feet of channel that ranges in width from 50 feet to 250 feet. Total area surveyed was 8 acres (Figure 5).

The evaluation of CWA WoUS was based upon the Corps' regulations and technical guidance issued by the USACE including, among other sources described further below, *USACE Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Arid West Region, December 2008 (Arid West Supplement)* and *USACE A Guide to Ordinary High Water Mark (OHWM) Delineation Arid West Region of the United States, 2010.* The lateral extent of USACE jurisdiction was measured at the Ordinary High Watermark (OHWM), which is indicated by physical characteristics such as a clear, natural line impressed on the bank, shelving, changes in the character of soil, destruction of terrestrial vegetation, the presence of litter and debris.

Evaluation of FGC Section 1600 Streambed Waters followed guidance in the FGC in the *MESA Field Guide*, described above, pursuant to which CDFW claims jurisdiction beyond traditional stream banks and the outer edge of riparian. Under MESA, the term stream is defined broadly to include "a body of water that flows perennially or episodically and that is defined by the area in which water currently flows, or has flowed, over a given course during the historic regime [i.e., 'circa 1800 to the present'], and where the width of its course can reasonably be identified by physical or biological indicators." Specifically, CDFW jurisdiction was delineated by measuring the elevations of land that confine a stream to a definite course when its waters rise to their highest level and to the extent of associated riparian vegetation. Here the extent of associated riparian vegetation was used to mark the lateral extent of the jurisdictional areas.

Other data recorded included bank height and morphology, substrate type, and vegetation within and adjacent to the low flow streambed.

Since under Porter-Cologne and the Procedures, "Waters of the State" are defined by "any surface water or groundwater, including saline waters, within the boundaries of the state" the jurisdictional evaluation followed the same procedures for FGC Section 1600 Streambed Waters. This took into account the top of bank to the top of bank.

A variety of reference materials relevant to the project site were reviewed during the course of this delineation, including historical and current aerial imagery, Federal Emergency Management Agency (FEMA) flood insurance rate maps (FIRM), National Oceanic & Atmospheric Administration (NOAA) climate data, USFWS National Wetland Inventory (NWI) and EPA Water Program "My Waters" data layers and United States Department of Agriculture (USDA), Natural Resources Conservation Service (NRCS) web soil survey. The data provided in the Web Soil Survey provides a standard basis for the soil textures and types that are assigned a hydric indicator status of "hydric" or "non-hydric" by the National Technical Committee for Hydric Soils.

RESULTS

Jurisdictional Wetlands

The bed of the unnamed ephemeral desert dry wash is mostly devoid of vegetation and the banks are bordered by a mix of big sagebrush (Holland code 35210) and desert saltbush scrub (Holland code 36110) comprising the Mojave desert scrub habitat. There is also cottonwood riparian habitat within the desert dry wash habitat (Figure 6). The wash has been subject to historic human disturbances and showed signs of recent disturbances such as OHV trails and trash. Surrounding land uses include undeveloped, residential development and railroad. Figure 7 provides a photo map showing the site conditions at the time of survey.

The wash lacks wetland hydrology, soils or plants. No wetlands occur in the survey area. Therefore, this wash is considered a non-wetland water.

Jurisdictional Waters

According to the USACE 2020 rule that narrows the scope of waters subject to federal regulation under the CWA, this wash is excluded as it is an ephemeral stream. An ephemeral stream flows only briefly during and following a period of rainfall in the immediate locality and is not influenced by groundwater. .Even though this wash is tributary to the Mojave River the "significant nexus text" in the 2015 Rule was abandoned in the 2020 rule and it is therefore non jurisdictional in terms of the federal CWA.

This wash is considered however, jurisdictional under the California FGC Section 1600 and Porter-Cologne as a State Streambed Water (Waters of the State). Within the survey area there are 6.73 acres of Waters of the State that fall under the authority of CDFW and RWQCB. The jurisdictional area that will be impacted encompasses cut banks, dry channel bed and no associated riparian vegetation (Figure 8). Below is a breakdown of project related impacts to the wash according to the plans provided.

Yates Road Crossing: The Project development proposes to construct an access road from Yates Road, across this wash to the development and to install three concrete drop structures. Five 6 X 10 culverts

will be constructed to accommodate the access road. Permanent impacts to the wash associated with the footprints of the access road, turn-about, parking areas, and storm drain total 2.43 acres.

Channel Drop Structures: The drop structures will be uniformly 3.8 feet in length and vary in width to accommodate the channel width. These estimated acreages are as follows:

Drop structure 1 - 3.8 feet by 90 feet = 342 square feet = 0.007 acre
Drop structure 2 - 3.8 feet by 100 feet = 380 square feet = 0.008 acre
Drop structure 3 - 3.8 feet by 140 feet = 532 square feet = 0.012 acre

Total permanent impacts to State Streambed Waters associated with the drop structures are calculated at 0.027 acre.

Therefore, combined total permanent impacts are 2.45 acres.

According to the plans, the wash will need to be recontoured to accommodate the new structure. With a total of 6.73 acres of Waters of the State and 2.45 acres of permanent impacts there, will be a temporary impact of 4.28 acres resulting from the recontouring. Once the Project is built the channel will remain in a natural desert dry wash state and flow naturally as it does now as an ephemeral wash.

CONCLUSIONS AND RECOMMENDATIONS

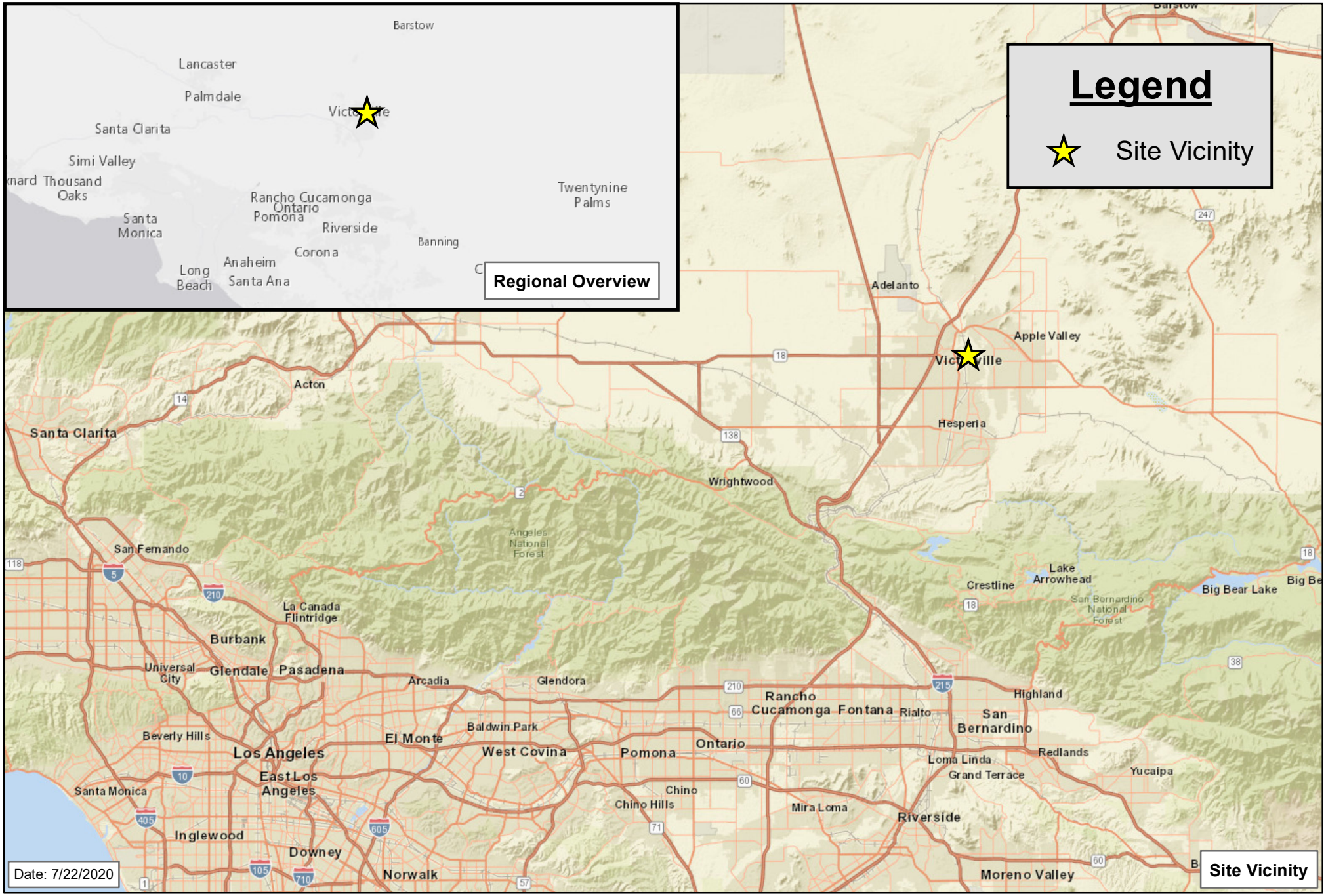
The channel morphology and hydrology make this channel subject to the California FGC and Porter-Cologne. Construction of the access road and in channel drop structures are considered an alteration of a State Streambed Water that falls under the jurisdictions of the CDFW and RWQCB. A Section 1600 Streambed Alteration Agreement from the CDFW and a Waste Discharge Requirement (WDR) Permit from the RWQCB will be required.

Please do not hesitate to contact me at 909-915-5900 should you have any questions or require further information.

Sincerely,

Shay Lawrey, President
Ecologist/Regulatory Specialist

Attachments:
Attachment A – Figures
Attachment B – Site Photos

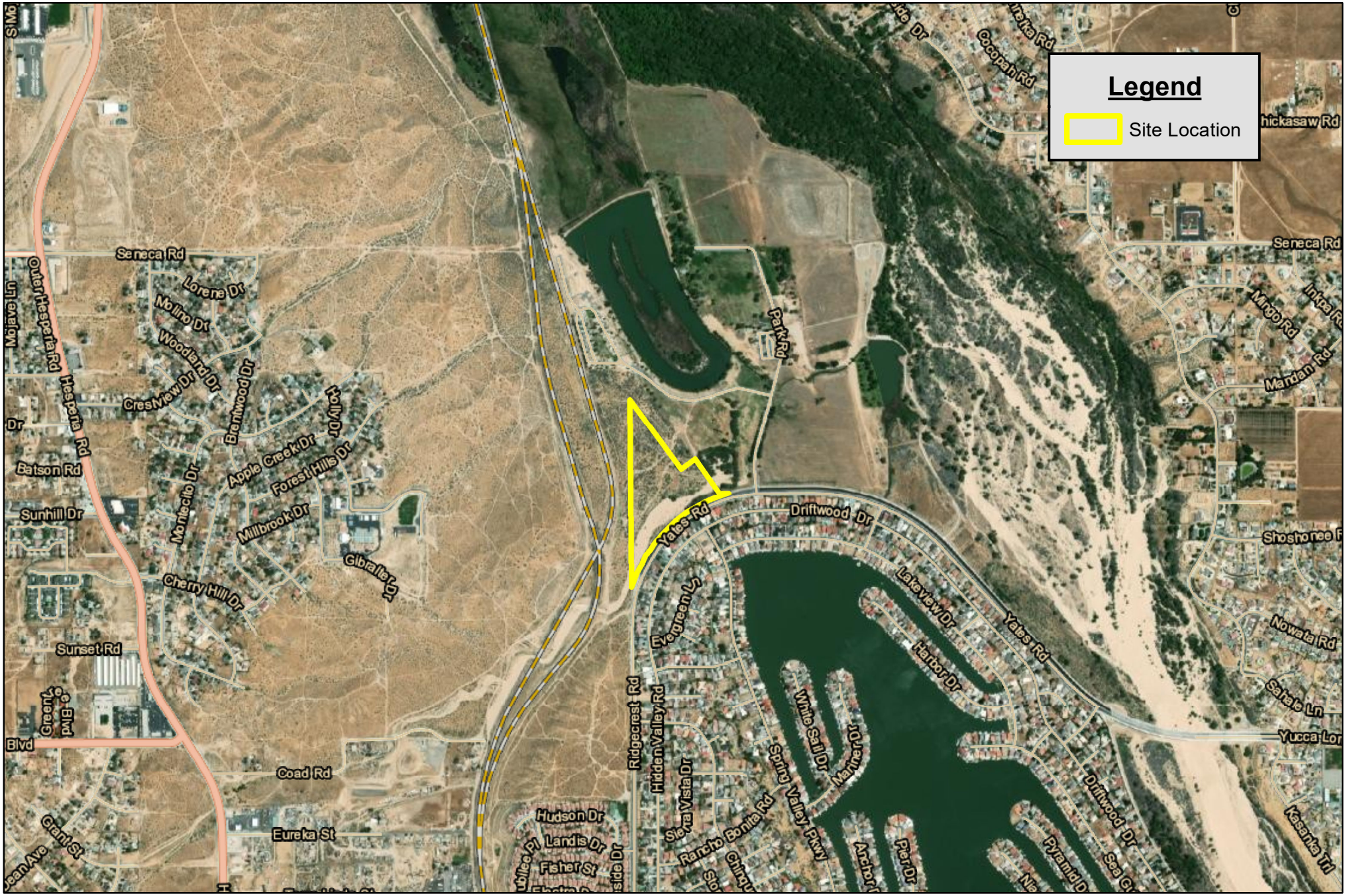


Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

JERICHO SYSTEMS INC.
Progress & Preservation

Figure 1 - Regional Overview
Site Vicinity

Victorville Residential Care Facility
Unincorporated Area, San Bernardino County, CA



0 500 1,000 2,000 3,000 4,000 Feet

Image Date: 8/6/2017

Service Layer Credits: Esri, HERE, Garmin, (c) OpenStreetMap contributors
Source: Esri, DigitalGlobe, GeoEye, Earthstar Geographics, CNES/Airbus DS, USDA, USGS, AeroGRID, IGN, and the GIS User Community

ÉRICHO SYSTEMS INC.
Progress & Preservation

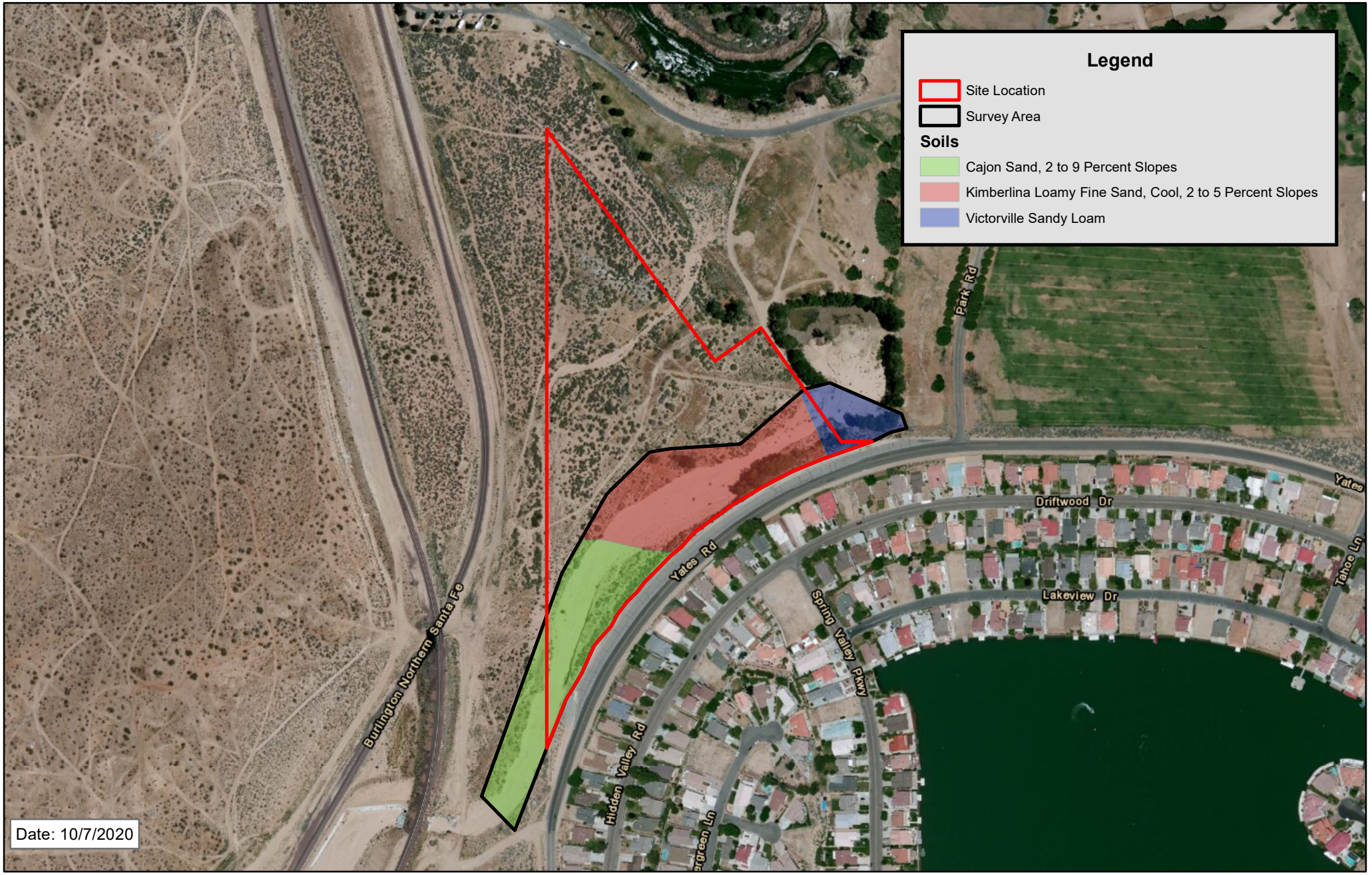
Figure 2
Site Location

Victorville Residential Care Facility
Unincorporated Area, San Bernardino County, CA

Source: Figure provided by Red Brick Solution Consulting Engineers & Architects

JÉRICHO SYSTEMS INC.
Progress & Preservation

Figure 3 Site Plan & Aerial Overview	Victorville Residential Care Facility Lilburn



0 0.0325 0.065 0.13 0.195 0.26 Miles

1 inch = 417 feet

Imagery Date: 8/6/2017

Service Layer Credits: Esri, HERE, Garmin, (c) OpenStreetMap contributors
Source: Esri, DigitalGlobe, GeoEye, Earthstar Geographics, CNES/Airbus DS, USDA, USGS, AeroGRID, IGN, and the GIS User Community

ÉRICHO SYSTEMS INC.
Progress & Preservation

Figure 4
Soils

Victorville Residential Care Facility
Unincorporated Area, San Bernardino County, CA

0 87.5 175 350 525 700
Feet

Image Date: 8/6/2017

Service Layer Credits: Source: Esri, DigitalGlobe, GeoEye, Earthstar Geographics, CNES/Airbus DS, USDA, USGS, AeroGRID, IGN, and the GIS User Community

ÉRICHO SYSTEMS INC.
Progress & Preservation

N

Figure 5
Survey Area

Victorville Residential Care Facility
Unincorporated Area, San Bernardino County, CA

0 87.5 175 350 525 700
Feet

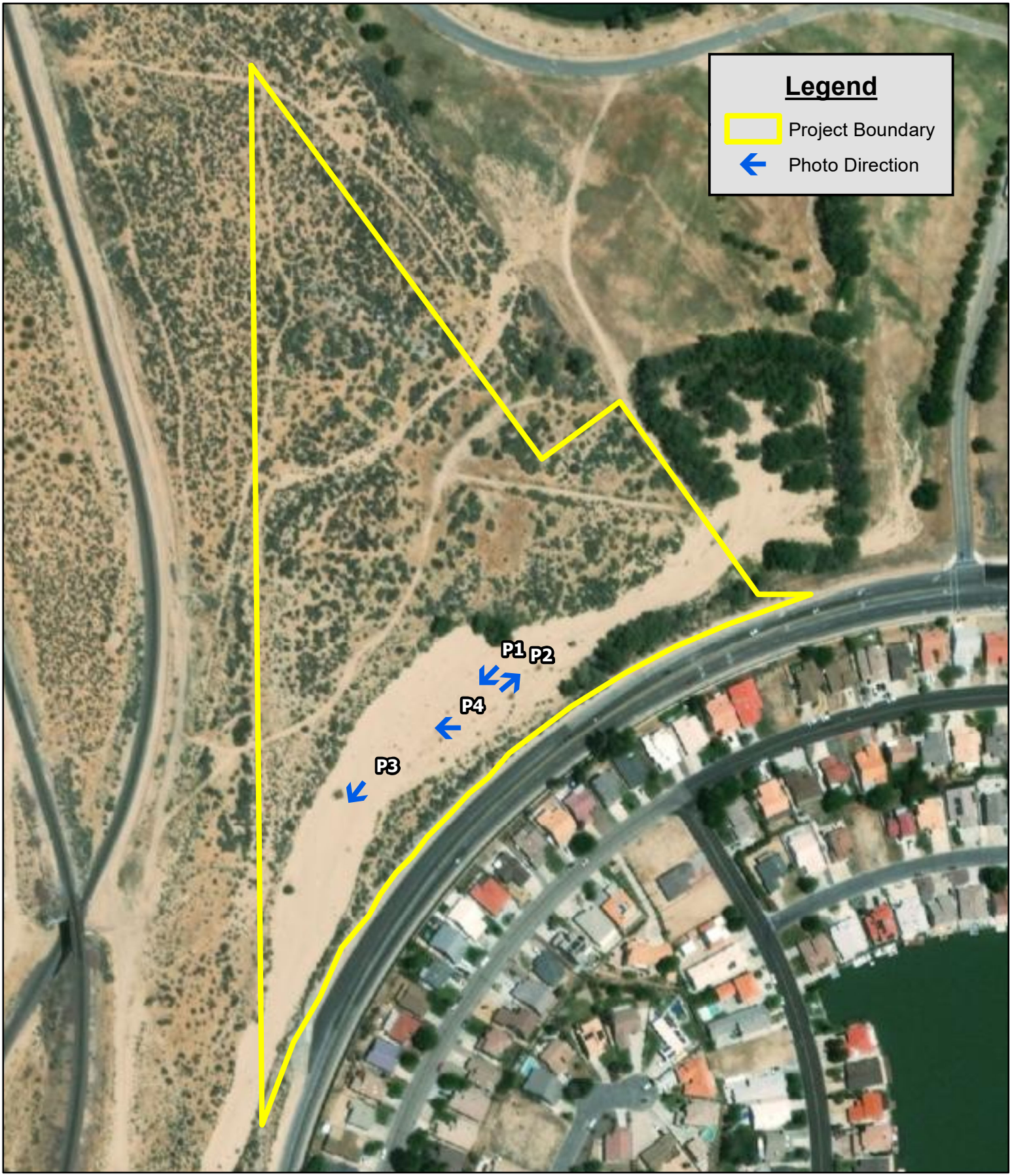
Image Date: 5/31/2019

Service Layer Credits: Source: Esri, DigitalGlobe, GeoEye, Earthstar Geographics, CNES/Airbus DS, USDA, USGS, AeroGRID, IGN, and the GIS User Community

ÉRICHO SYSTEMS INC.
Progress & Preservation

Figure 6
Habitat

Victorville Residential Care Facility
Unincorporated Area, San Bernardino County, CA



0 75 150 300 450 600 Feet

Image Date: 5/31/2019

Service Layer Credits: Source: Esri, DigitalGlobe, GeoEye, Earthstar Geographics, CNES/Airbus DS, USDA, USGS, AeroGRID, IGN, and the GIS User Community

ÉRICHO SYSTEMS INC.
Progress & Preservation

N

Figure 7
Photo Map

Victorville Residential Care Facility
Unincorporated Area, San Bernardino County, CA

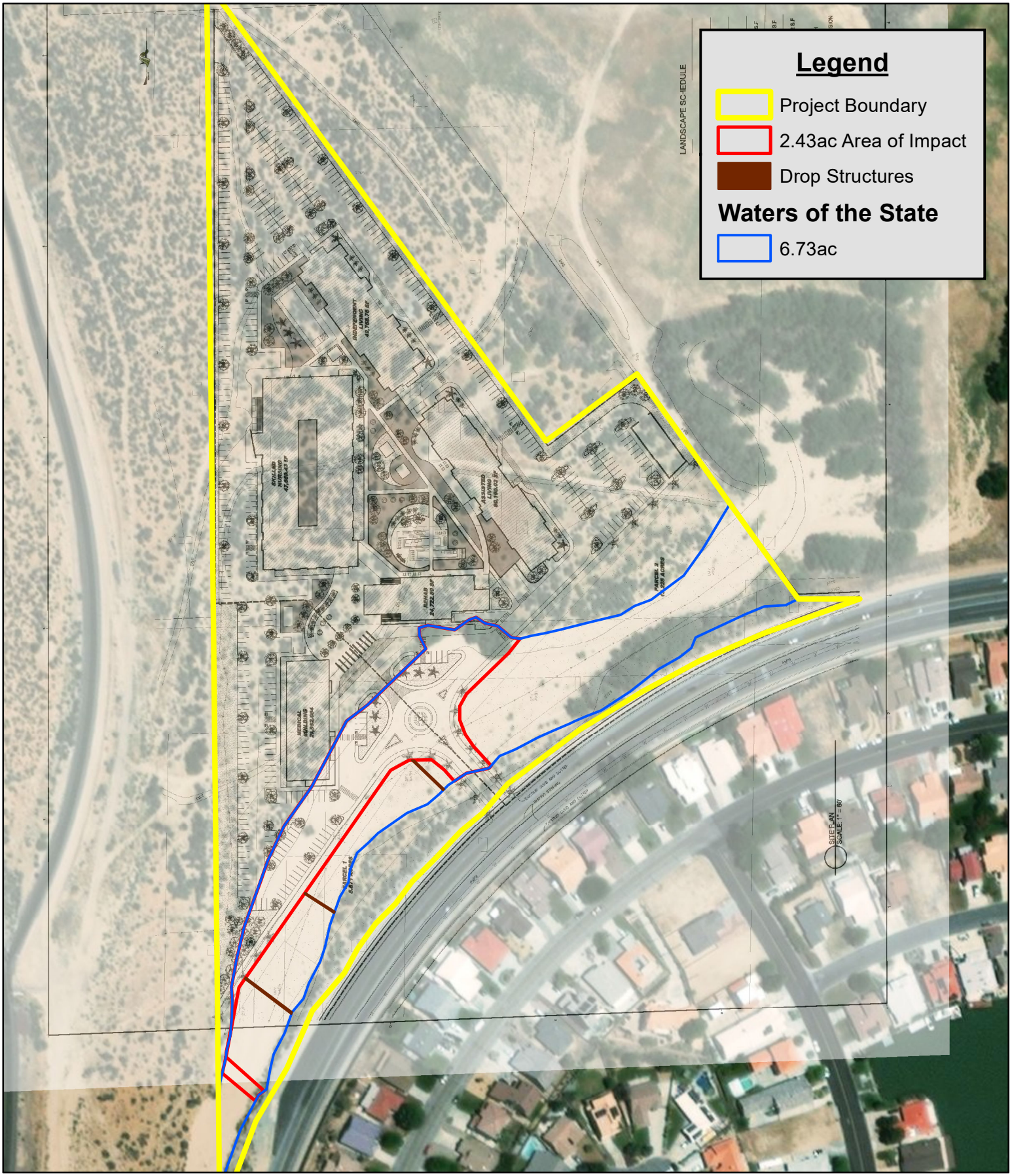


Image Date: 8/6/2017

0 65 130 260 390 520 Feet

Source: Figure provided by Red Brick Solution Consulting Engineers & Architects

Service Layer Credits: Source: Esri, DigitalGlobe, GeoEye, Earthstar Geographics, CNES/Airbus DS, USDA, USGS, AeroGRID, IGN, and the GIS User Community

ÉRICHO SYSTEMS INC.
Progress & Preservation

Figure 8
Jurisdictional Impacts

Victorville Residential Care Facility
Unincorporated Area, San Bernardino County, CA

Photo 1. Standing in center of the survey area facing upstream..

Photo 2. Standing in center of the survey area facing downstream.

Photo 3. Looking at typical site conditions on the upstream end.

Photo 4. Looking at typical site conditions where access road is proposed.